IN THE SPECIFICATION

Page 1, before paragraph [0001], insert

This application is a §371 of PCT/EP2004/003796 filed April 8, 2004 which claims priority from German Patent Application No: 103 17 027.8 filed April 11, 2003.

BACKGROUND AND SUMMARY OF THE INVENTION

Page 3, [0013] delete ~~The following are schematic representations:~~ and insert

BRIEF DESCRIPTION OF THE FIGURES

Page 4, after [0023], insert

DETAILED DESCRIPTION

Page 4-5, [0026] Amend as follows:

A divergent plasma beam is to be understood as a plasma beam which markedly radiates in at least one direction perpendicular to the main direction of radiation, i.e., the direction of greatest plasma beam density. Usually the main direction of radiation is called a "source normal." A beam divergence can be described approximately by an exponent n of a cosine distribution. The exponent n of the cosine distribution is a measure of the beam divergence. The greater n is, the more divergent is the plasma beam. A detailed treatment of such distribution function is to be found in G. Deppisch: Coating Thickness Uniformity of Vapor-deposited Coatings in Theory and Practice, Vakuum Technik, Vol. 30, No. 3, 1981. Fig. 2 shows curves of $\cos^n$ distributions of a relative ion current of a plasma beam as a function of the angle of the radiation to the source normal for various values of n. This distribution is a mathematically calculated magnitude which indicates how greatly the ion beam density depends on the angle. In the case of a greatly divergent beam (n = 1) at an angle of, ~~e.g., 40~~ e.g., 40° to the source normal, 78% is reached of the value which is emitted in the direction of the source normal. At n = 8, however, only 13% is emitted at this angle. In the case of a plasma beam with n = 16 or n = 36, virtually no plasma beam is present at an angle of 40°. In Fig. 3 the geometric ratios in a

vacuum chamber 7 constructed as a coating chamber are represented. In the coating chamber 7 a plurality of substrates 10.1, 10.2, 10.3, 10.4, 10.5 and 10.6 are arranged on a substantially spherical dome 11. The dome 11 has the shape of a section of a ball cup. The substrates 10.1, 10.2, 10.3, 10.4, 10.5 and 10.6 are each placed on circles on the dome 11, i.e., each reference number designates a plurality of substrates which are arranged on the particular circle on the dome 11. The vertical broken lines correspond to the direction of a source normal or of one parallel thereto. The innermost circle with the substrates 10.1 corresponds to a dome angle α of, for example, 9°, the next circle with the substrates 10.2 an angle of $\alpha = 14°$, the next circle with substrates 10.3 an angle of $\alpha = 21°$, the next circle with the substrates 10.4 an angle of $\alpha = 27°$, the next with an angle of $\alpha = 33°$ and the outermost circle with an angle of $\alpha = 39°$.

Page 12, before claim 1, delete ~~CLAIMS~~ with

What is Claimed: